

General Storm Water Industrial Permit Helpful Information

The following guide has been prepared to help assist you with understanding the basic components of your General Virginia Pollutant Discharge Elimination System (VPDES) Permit for Discharges of Storm Water Associated with Industrial Activity (SWGP). It is not intended to be all inclusive or imply that by following this guide you will be considered in compliance with your permit. It is provided for informational purposes only.

Storm Water Pollution Prevention Plan (SWP3)

The Storm Water Pollution Prevention Plan (SWP3) is a written document developed specifically for your facility. There is no right way or wrong way to develop a SWP3, but the plan must include all of the items required in Part III and Part IV of your permit. The SWP3, at a minimum, identifies all storm water discharges at the facility, sources of contamination (actual or potential), and requires that best management practices (BMPs) be implemented to reduce the impact of storm water runoff on the receiving stream. The SWP3 is a “living document” that is to be updated as conditions and activities at your facility change. These changes should be documented and maintained within the SWP3.

DEQ staff is not able to assist you in the development of your facility’s SWP3. Sample plans are available upon request. You may also find the following websites helpful in the development and maintenance of your SWP3 -

http://www.epa.gov/npdes/pubs/industrial_swppp_guide.pdf

http://cfpub.epa.gov/npdes/stormwater/msgp.cfm#msgp2008_swppp

- After clicking the link, scroll to the bottom of the page and click on the link “Sample Record Keeping Templates” under the Developing SWPPPs, Reporting Monitoring Data and Annual Reports header.

Please see the last page of this guide for companies and commercial laboratories that you mind find helpful.

Quarterly Visual Monitoring (Part I.A.1.a)

Quarterly visual monitoring is conducted and documented once per quarter at the facility’s designated storm water outfall location(s). With this monitoring, a sample is not collected and sent to a commercial laboratory for further analysis. Rather, the sample is collected and immediately observed by facility staff for the presence or absence of the nine indicators of storm water pollution listed in Part I.A.1.a.2 of the permit. The best “tool” for conducting this test is a clear container such as a mason jar. Once the visual observation is complete and documented, the sample may be discarded.

Part I.A.1.a.3 of the permit outlines exactly what must be documented by facility staff during quarterly visual monitoring. The results of visual monitoring do not need to be submitted to DEQ. Results must be maintained on site with the SWP3. This documentation will be reviewed by DEQ during water compliance inspections. DEQ does not provide forms for this monitoring and staff is not able to assist you in the development of forms. You may find the following websites helpful in the development of your visual monitoring forms and sample collection -

http://cfpub.epa.gov/npdes/stormwater/msgp.cfm#msgp2008_swppp

- After clicking the link, scroll to the bottom of the page and click on the link "Sample Record Keeping Templates" under the Developing SWPPPs, Reporting Monitoring Data and Annual Reports header.

http://cfpub.epa.gov/npdes/stormwater/msgp.cfm#msgp2008_swppp

- After clicking the link, scroll to the bottom of the page and click on the link "Industrial Storm Water Monitoring and Sampling Guide" under the Developing SWPPPs, Reporting Monitoring Data and Annual Reports header.

Benchmark Monitoring (Part I.A.1.b)

Benchmark monitoring is to be conducted twice per year at the facility's designated storm water outfall location(s) - once between January 1 and June 30 and once between July 1 and December 31. With this monitoring, samples are collected and sent to a commercial laboratory for further analysis. The results of benchmark monitoring must be submitted to DEQ on the Discharge Monitoring Report (DMR) form which was included in your permit package. Additional copies of this form should be made prior to its first use so that the form may continue to be used until the expiration of the permit in 2019. Before submitting your results to DEQ ensure you make a copy of the submittal to be maintained on site with your SWP3. This documentation will be reviewed by DEQ during water compliance inspections.

It is recommended that you contact a commercial laboratory well in advance of sample collection. Services vary, but some commercial laboratories and/or consultants will handle everything from sample collection through data submittal for you. DEQ does not recommend the use of any particular company or commercial laboratory. Please see the last page of this guide for companies and commercial laboratories that you may find helpful. It is up to the recipient of this information to determine if a particular laboratory is acceptable for their needs. Under the Freedom of Information Action (FOIA) you may request to view inspection records for any commercial laboratory previously inspected by the Department of Environmental Quality – Northern Regional Office. Should you wish to view any of these records, please contact the Northern Regional Office to schedule an appointment.

You may find the following website helpful for sample collection -

http://cfpub.epa.gov/npdes/stormwater/msgp.cfm#msgp2008_swppp

- After clicking the link, scroll to the bottom of the page and click on the link "Industrial Storm Water Monitoring and Sampling Guide" under the Developing SWPPPs, Reporting Monitoring Data and Annual Reports header.

Chesapeake Bay TMDL Monitoring (Part I.B.7.b)

Chesapeake Bay TMDL monitoring is to be conducted twice per year at the facility's designated storm water outfall location(s) - once between January 1 and June 30 and once between July 1 and December 31. This monitoring is required only for the first four monitoring periods after the facility has been granted permit coverage. With this monitoring, samples are collected and sent to a commercial laboratory for further analysis. The results of Chesapeake Bay TMDL monitoring must be submitted to DEQ on the Discharge Monitoring Report (DMR) form which was included in your permit package. Additional copies of this form should be made prior to its first use so that the form may continue to be used until this sampling requirement is completed. Before submitting your results to DEQ ensure you make a copy of the submittal to be maintained on site with your SWP3. This documentation will be reviewed by DEQ during water compliance inspections.

The purpose of this monitoring is to determine the contributions from the permitted facility for Total Nitrogen (TN), Total Phosphorus (TP), and Total Suspended Solids (TSS). At the end of the four monitoring periods the permittee is to average the data collected at the facility for each of the above parameters. That is all Total Nitrogen results for all outfalls at the facility shall be averaged collectively (not on an outfall-by-outfall basis) as well as those results for Total Phosphorus and Total Suspended Solids and then used to calculate the facility's loading. These loadings are to then be compared to those values listed in Part I.B.7.b.3.a of the permit. If the facility's loadings are greater than those listed in Part I.B.7.b.3.a of the permit, the permittee is to develop and submit to DEQ for review and approval a Chesapeake Bay TMDL Action Plan which is to outline steps being undertaken at the facility to reduce TN, TP, and/or TSS loads.

Routine Facility Inspections (Part III.B.5)

Inspections of the facility must be conducted and documented at least once per quarter unless a more frequent interval is expressed within the permit. If a more frequent interval is required, that information would be provided within Part IV of the permit. Inspections are to be conducted in all areas of the facility where industrial materials or activities are exposed to storm water. Part III.B.5 of the permit describes this requirement in more detail.

The documentation showing facility inspections have been completed does not need to be submitted to DEQ. This documentation must be maintained on site with the SWP3. This documentation will be reviewed by DEQ during water compliance inspections. DEQ does not provide forms for this permit requirement and staff is not able to assist you in the development of forms. You may find the following website helpful in the development of your facility inspection forms -

http://cfpub.epa.gov/npdes/stormwater/msgp.cfm#msgp2008_swppp

- After clicking the link, scroll to the bottom of the page and click on the link "Sample Record Keeping Templates" under the Developing SWPPPs, Reporting Monitoring Data and Annual Reports header.

Employee Training (Part III.B.4.b.6)

A storm water employee training program must be implemented for all employees at the facility. Part III.B.4.b.6 of the permit outlines exactly what must be covered in this training program. Part IV of the permit may outline additional training requirements. Storm water training may be incorporated in to any training already being conducted by the facility. It is strongly recommended that employee training be conducted on an annual basis.

Employee training must be documented. The documentation showing employee training has been completed does not need to be submitted to DEQ. This documentation will be reviewed by DEQ during water compliance inspections. DEQ does not provide forms for this permit requirement and staff is not able to assist you in the development of forms. You may find the following website helpful in the development of your employee training forms -

http://cfpub.epa.gov/npdes/stormwater/msgp.cfm#msgp2008_swppp

- After clicking the link, scroll to the bottom of the page and click on the link "Sample Record Keeping Templates" under the Developing SWPPPs, Reporting Monitoring Data and Annual Reports header.

Annual Outfall Evaluation for Unauthorized Discharges (Part III.D.2)

The SWP3 shall include documentation that all storm water outfalls associated with industrial activity have been evaluated annually for the presence of unauthorized discharges. This is commonly referred to as a “non-storm water evaluation”. Facility staff should ideally view the storm water outfall location(s) on a day when it is not raining. The purpose of this is to determine if there are any discharges, other than storm water, leaving the facility via the storm water outfall location(s). Part III.D.2.a of the permit outlines exactly what must be covered in this evaluation and subsequent documentation.

The unauthorized discharge evaluation does not need to be submitted to DEQ. This documentation must be maintained on site with the SWP3. This documentation will be reviewed by DEQ during water compliance inspections. DEQ does not provide forms for this permit requirement and staff is not able to assist you in the development of forms

Comprehensive Site Compliance Evaluation and Report (Part III.E)

The comprehensive site compliance evaluation and report must be completed at least once per year. The evaluation is designed to be a review of all training performed, facility inspections completed, maintenance performed, quarterly visual examinations conducted throughout the year and a review of the facility’s Best Management Practices. Part III.E.1 and Part III.E.3 of the permit outlines exactly what must be covered in this evaluation and report.

The comprehensive site compliance evaluation report does not need to be submitted to DEQ. This documentation must be maintained on site with the SWP3. This documentation will be reviewed by DEQ during water compliance inspections. DEQ does not provide forms for this permit requirement and staff is not able to assist you in the development of forms.

Signatory Responsibility

- All reports required by the permit must be signed by a responsible corporate officer or duly authorized representative. See Part II.K.1 and Part II.K.2 of the permit for a detailed listing of individuals authorized to sign the required reports.
- All reports signed in accordance with Part II.K.1 and Part II.K.2 must contain the certification statement found in Part II.K.4.

Storm Water Sampling

You should contact a commercial laboratory early in the monitoring period to ensure you have the appropriate sample containers. Your chosen laboratory must be a Virginia Environmental Laboratory Accreditation Program (VELAP) certified laboratory for each parameter that you are required to sample. For example, if you have to sample for Total Suspended Solids (TSS) and Total Petroleum Hydrocarbons (TPH) your lab must be VELAP certified for both TSS and TPH. It is recommended that you sample as early in the monitoring period as possible to allow for unforeseen issues such as lost samples, broken sample containers, etc.

Storm water samples are grab samples that are to be taken within the first thirty minutes of discharge (up to first three hours if not practicable within thirty minutes) and should be representative of the discharge leaving your property. Key factors in sample collection include –

- Collect sample directly in bottle provided by lab
- Don't touch the opening of the bottle or the cap
- Attempt to collect sample where there is a moderate flow of storm water (**DO NOT** sample a puddle or standing water)
- Attempt to collect the samples as close to the middle of the storm water flow as possible
- Avoid touching the bottom and sides of pipes and channels which will prevent stirring up of sediments and other solids
- Avoid letting uncharacteristic debris into the samples

You may find the following websites helpful with storm water sampling -

http://water.epa.gov/polwaste/npdes/stormwater/upload/msgp_monitoring_guide.pdf

<http://www.pca.state.mn.us/index.php/view-document.html?gid=16182>

<http://www.youtube.com/watch?v=oWKdonc9iDw>

Compliance Services Guide

Services vary, but some commercial laboratories and/or consultants will handle everything from sample collection through data submittal for you. DEQ does not recommend the use of any particular laboratory. It is up to the recipient of this information to determine if a particular commercial laboratory and/or consultant is acceptable for their needs. Under the Freedom of Information Action (FOIA) you may request to view inspection records for any commercial laboratory previously inspected by DEQ – Northern Regional Office. Please contact the Northern Regional Office to schedule an appointment.

James Environmental

- <http://www.jamesenvironmental.com/>
- 600 Round Rock West Drive, Suite 201, Round Rock, TX 78681
- (512) 244-0853

Environmental System Services

- <http://www.ess-services.com/>
- 218 North Main Street, Culpeper, VA 22701
- (800) 541-2116

Mid-Atlantic Laboratories

- <http://www.midatlanticlaboratories.com>
- 224 Main Street, Suite 1, Port Royal, VA 22535
- (804) 742-5577

EnviroCompliance Laboratories

- <http://www.envirocompliance.com/index.html>
- 10357 Old Keeton Road, Ashland, VA 23005
- (804) 550-3971

James R. Reed and Associates

- <http://www.jrreed.com/>
- 770 Pilot House Road, Newport News, VA 23606
- (800) 873-4703

Universal Laboratories

- <http://www.universallaboratories.net/>
- 20 Research Drive, Hampton, VA 23666
- (800) 695-2162

The link below will connect you to a website where you can search for more laboratory information/locations/etc.

- <http://www.thomasnet.com/virginia/laboratories-96155775-1.html>